Disposal of radioactive wastes

1700. SHRI KRIPAL PARMAR:
SHRI B.J. PANDA:

Will the PRIME MINISTER be pleased to state:

(a) whether it is a fact that management and disposal of long-life radioactive wastes, has been a technical and political problem the world over;

(b) whether it is fact that Energy Research Group of Reliance in their report has recommended certain solutions for safe storage of nuclear waste; and

(c) if so, the details thereof with action plan of Government to address the issue?

THE MINISTER OF STATE IN THE PRIME MINISTER OFFICE (SHRI PRITHVIRAJ CHAVAN): (a) The management and disposal of long life radioactive wastes has been an important issue world over. Safe technological solutions do exist and several countries have taken steps in this direction. Disposal of such waste in deep geological formations is an accepted option. Many countries including India have similar approach. International programmes supported by agencies like International Atomic Energy Agency (IAEA) on public awareness have been going on to educate the public and mitigate their apprehensions.

(b) The Energy Research Group of Reliance Industries Ltd., have prepared a review report which briefly covers aspects of radioactive waste disposal. The report concludes that there is an international consensus on disposal of long-lived radioactive waste in deep geological formations on land.

(c) The work on development of process and technology for management of radioactive waste was started by the Department of Atomic Energy about four decades ago along with the development of other components of Indian Nuclear Energy Programme. A three step strategy has been adopted in India for the management of long lived radioactive waste, which comprises of:—

(i) conversion of radioactive waste into stable, inert, solid waste form such as borosilicate glass,

(ii) interim storage for a period of 30-50 years, and

(iii) final disposal in deep underground geological repository in the long term.

The Indian programme in the area of radioactive waste management for long-lived waste is fully geared up to meet the country's needs.

Titanium deposit left by Tsunami on Tamil Nadu beaches

1701. SHRI EKANATH K. THAKUR: Will the PRIME MINISTER be pleased to state:

(a) whether it is a fact that the December 26 Tsunami has left behind millions of tonnes of titanium ore on the beaches of Tamil Nadu;

(b) whether it is also a fact that known global resources of the ore are in the range of 285 million tonnes and titanium is among the most sought after metals in the world; and

(c) if so, in what manner Government propose to use the newly added titanium on the because of Tamil Nadu?

THE MINISTER OF STATE IN THE PRIME MINISTER'S OFFICE (SHRI PRITHVIRAJ CHAVAN): (a) Along the coastal sretches of Tamil Nadu, the deposition of heavy minerals due to tsunami is patchy, inconsistent and with a maximum thickness of 30-40 cm. Among the existing deposits, llmenite and Rutile are titanium bearing minerals. In some instances the tsunami waves have destroyed the existing concentrations in dunes and deposited them inland, thereby relocating the existing deposits. Thus there is no substantial enhancement of heavy mineral deposits in Tamil Nadu.

(b) Yes, Sir. Titanium is the metal of future and India has an abundant resource of titanium minerals. The resources of titanium ore (ilmenite) in India alone is 374 million tonnes as on 1.1.2004 based on the studies by Atomic Minerals Directorate for Exploration & Research (AMD).

(c) Does not arise.